

# SD103AWS...SD103CWS

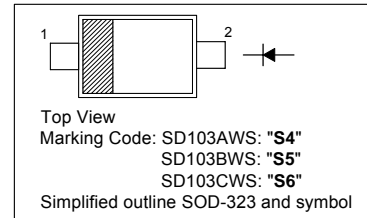
## SURFACE MOUNT SCHOTTKY BARRIER DIODE

### Features

- Low Forward Voltage

### PINNING

PIN	DESCRIPTION
1	Cathode
2	Anode

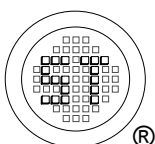


### Absolute Maximum Ratings ( $T_a = 25\text{ }^\circ\text{C}$ )

Parameter	Symbol	Value	Unit
Peak Repetitive Reverse Voltage	SD103AWS	40	V
	SD103BWS	30	
	SD103CWS	20	
Average Forward Rectified Current	$I_{F(AV)}$	350	mA
Non-Repetitive Peak Forward Surge Current at $t \leq 1\text{ s}$	$I_{FSM}$	2	A
Power Dissipation	$P_{tot}$	200	mW
Operating and Storage Temperature Range	$T_j, T_s$	- 65 to + 125	$^\circ\text{C}$

### Characteristics at $T_a = 25\text{ }^\circ\text{C}$

Parameter	Symbol	Min.	Typ.	Max.	Unit
Reverse Breakdown Voltage at $I_R = 10\text{ }\mu\text{A}$	SD103AWS	40	-	-	V
	SD103BWS	30	-	-	
	SD103CWS	20	-	-	
Reverse Leakage Current at $V_R = 30\text{ V}$ at $V_R = 20\text{ V}$ at $V_R = 10\text{ V}$	SD103AWS	-	-	5	$\mu\text{A}$
	SD103BWS	-	-	5	
	SD103CWS	-	-	5	
Forward Voltage at $I_F = 20\text{ mA}$ at $I_F = 200\text{ mA}$	$V_F$	-	-	0.37	V
		-	-	0.6	
Total Capacitance at $V_R = 0\text{ V}$ , $f = 1\text{ MHz}$	$C_T$	-	50	-	pF
Reverse Recovery Time at $I_F = I_R = 50\text{ mA}$ to $200\text{ mA}$ , Recover to $0.1 I_R$	$t_{rr}$	-	10	-	ns



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 ISO 14001:2004 Certificate No. 7116  
 ISO 9001:2000 Certificate No. 0506098

Dated : 17/11/2006

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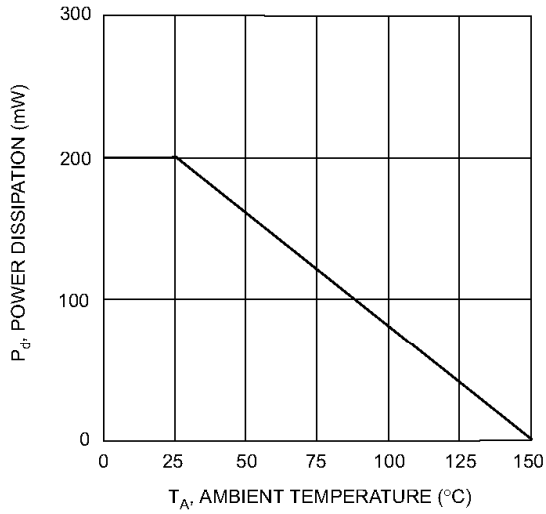


Fig. 1 Power Derating Curve

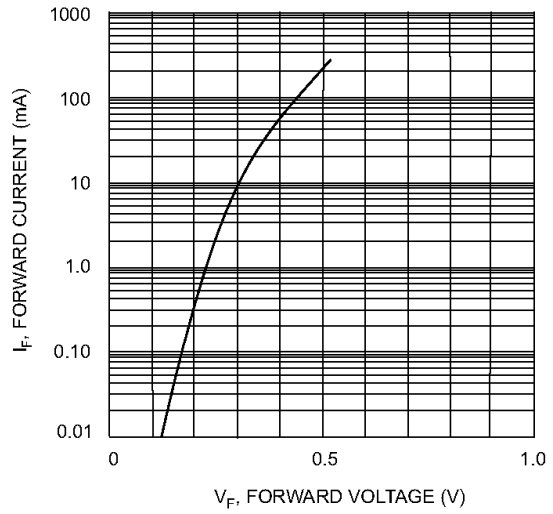


Fig. 2 Typical Forward Characteristics

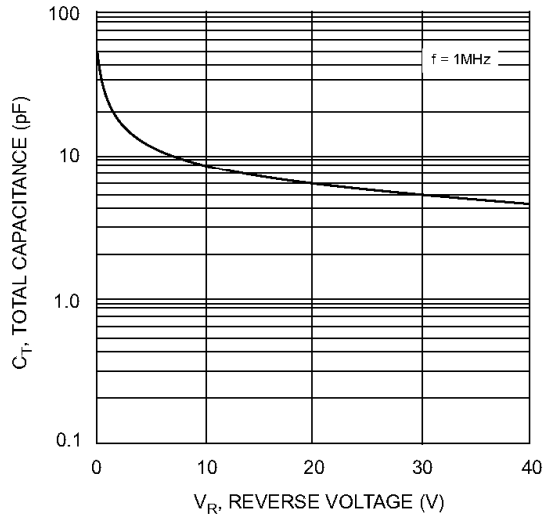
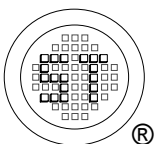


Fig. 3 Total Capacitance vs Reverse Voltage



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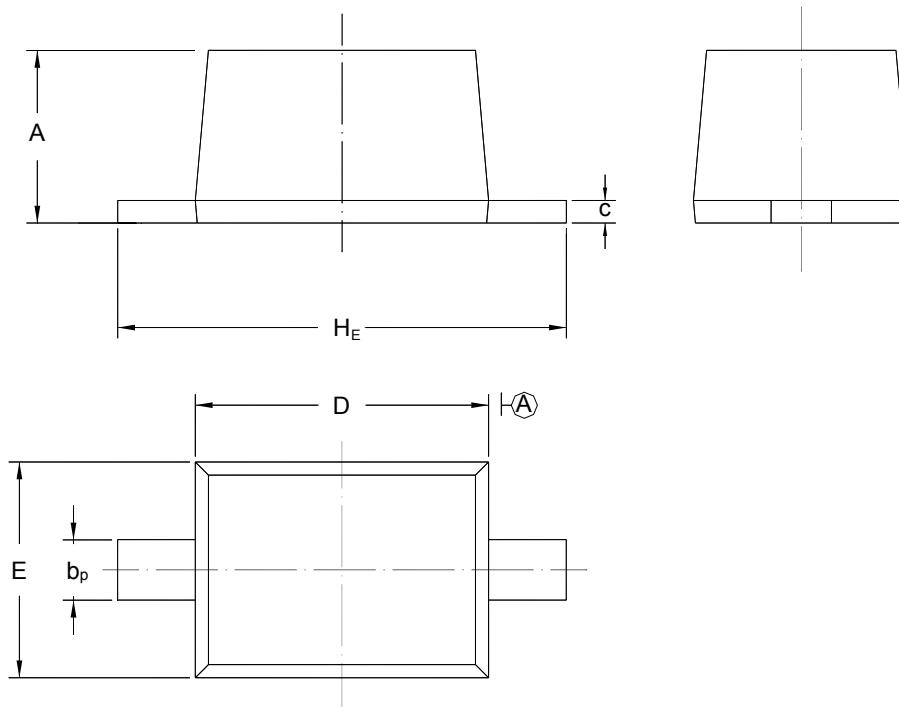
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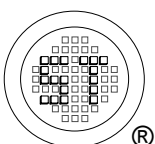
## PACKAGE OUTLINE

Plastic surface mounted package; 2 leads

SOD-323



UNIT	A	b <sub>p</sub>	C	D	E	H <sub>E</sub>
mm	1.10 0.80	0.40 0.25	0.15 0.00	1.80 1.60	1.35 1.15	2.80 2.30



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